



Hydrilla

An Invasive Plant Threatening Waterways

Hydrilla is an aggressive submerged aquatic weed that is not native to North America. It can grow and reproduce quickly, and its tubers can remain viable for at least six years. It has been identified as one of the biggest threats to the natural resources of the Eno River. If untreated, it will spread further downstream into Falls Lake, negatively impacting natural resources. Over time, future costs of treating hydrilla will increase.

What is hydrilla?

Hydrilla (*Hydrilla verticillata*) is:

- A submerged aquatic weed native to South Asia that is regulated at federal and state levels. As a prohibited plant, it is illegal to culture, sell, trade or transport it.
- An invasive species that can grow and reproduce quickly.



The variety of hydrilla found in North Carolina (monoecious) grows as a perennial plant. It dies back (senesces) in the fall, and tubers sprout in the spring leading to the next crop.

Hydrilla is an invasive plant that reproduces quickly. Source: Leslie J. Mehrhoff, University of Connecticut, Bugwood.org

History in the Eno River Watershed

Hydrilla was first found in the early 1990s in Lake

Orange, a source of water for the town. Management began in 1994 by stocking the lake with triploid grass carp. For two decades, hydrilla was successfully managed there; however, the plant started to show up again in recent years and has been found in Corporation Lake, a drinking water impoundment along the Eno River just west of Hillsborough.

- The first documented sighting of hydrilla in Eno River State Park was in 2005. Limited hydrilla survey and monitoring work has occurred annually from 2006-2012.
- The West Fork Eno Reservoir, owned by the town, was confirmed to have hydrilla in 2009. It is currently stocked with triploid grass carp and being successfully managed.
- A task force of public interest groups and federal, state and local governments came together in 2012.
- An organized survey was conducted in the fall of 2013 and found about 25 miles of river containing hydrilla at differing densities. The most infested extent encompasses about 15 miles of river from the U.S. 70 bridge at Hillsborough to Guess Road in Durham.
- In 2014, Arrowhead Lake, which is due east of and flows into Lake Orange, was found to be infested. No historical records of hydrilla management effort at Arrowhead Lake are known.

Potential Impacts

As one of the biggest threats to the natural resources of the Eno River, hydrilla has the potential to negatively impact fish and wildlife communities and recreation.

- Hydrilla can grow across the entire river, potentially reducing fish habitat, out competing native riverweed and impeding swimming, boating and fishing activities.
- Hydrilla can clog raw water intakes like the one the town uses to draw water for treatment as drinking water which results in more frequent maintenance and even replacement of the intake.
- Hydrilla can harbor mosquitoes and impose public health issues due to the threat of mosquito-borne diseases.
- Hydrilla has been linked to avian vacuolar myelinopathy, a syndrome that results in death for American coots and other waterfowl, as well as birds of prey, including bald eagles that feed on affected waterfowl.